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DIVISION OF ENGINEERING SERVICES
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**** WARNING ** WARNING ** WARNING ** WARNING ****
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November 3, 2005

07-LA-710-29.6/42.4
07-242604
ACSTPHG-710-1(783)E

Addendum No. 3

Dear Contractor:

This addendum is being issued to the contract for construction on State highway in LOS ANGELES COUNTY AT VARIOUS LOCATIONS FROM 0.1 KM SOUTH OF FIRESTONE BOULEVARD OVERCROSSING TO 0.1 KM SOUTH OF ROUTE 10/710 SEPARATION.

Submit bids for this work with the understanding and full consideration of this addendum. The revisions declared in this addendum are an essential part of the contract.

Bids for this work will be opened on December 1, 2005. The original bid opening date was previously postponed indefinitely under Addendum No. 2 dated September 6, 2005.

This addendum is being issued to set a new bid opening date as shown herein, revise the Project Plans, the Notice to Contractors and Special Provisions, and the Proposal and Contract.

Project Plan Sheets 6, 7, 9, 10, 11, 14, 15, 17, 18, 19, 21, 22, 23, 24, 28, 29, 34, 37, 38, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 63, 64, 96, 97, 201 and 202 are revised. Half-sized copies of the revised sheets are attached for substitution for the like-numbered sheets.

Project Plan Sheets 65A, 65B and 65C are added. Half-sized copies of the added sheets are attached for addition to the project plans.

In the Special Provisions, Section 8-1.06, "ASPHALT," is added as attached.

In the Special Provisions, Section 10-1.24, "EARTHWORK," the following paragraph is added after the last paragraph:

"Full compensation for removing existing 200 mm underdrain shall be considered as included in the contract price paid per cubic meter for roadway excavation and no separate payment will be made therefor."

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In the Special Provisions, Section 10-1.31, "GRIND EXISTING CONCRETE PAVEMENT," the following paragraph is added after the sixth paragraph:

"The 300 mm wide grinding shall be performed in the longitudinal direction of the existing traveled way along the longitudinal joint before placing concrete pavement."

In the Special Provisions, Section 11, "MODIFIED STANDARD SPECIFICATIONS," is added as attached.

In the Proposal and Contract, the Engineer's Estimate Items 61, 64, 66, 67, 68, 69, 70 and 71 are revised, Items 84, 85, 86 and 87 are added and Item 83 is deleted as attached.

To Proposal and Contract book holders:

Replace pages 6 and 7 of the Engineer's Estimate in the Proposal with the attached revised pages 6 and 7 of the Engineer's Estimate. The revised Engineer's Estimate is to be used in the bid.

Inquiries or questions in regard to this addendum must be communicated as a bidder inquiry and must be made as noted in the NOTICE TO CONTRACTORS section of the Notice to Contractors and Special Provisions.

Indicate receipt of this addendum by filling in the number of this addendum in the space provided on the signature page of the proposal.

Submit bids in the Proposal and Contract book you now possess. Holders who have already mailed their book will be contacted to arrange for the return of their book.

Inform subcontractors and suppliers as necessary.

This office is sending this addendum by UPS overnight mail to Proposal and Contract book holders to ensure that each receives it. A copy of this addendum is available for the contractor's use on the Internet Site:

http://www.dot.ca.gov/hq/esc/oe/weekly_ads/addendum_page.html

If you are not a Proposal and Contract book holder, but request a book to bid on this project, you must comply with the requirements of this letter before submitting your bid.

Sincerely,

ORIGINAL SIGNED BY

REBECCA D. HARNAGEL, Chief
Office of Plans, Specifications & Estimates
Office Engineer

Attachments

8-1.06 ASPHALT

Asphalt shall conform to the provisions in Section 92 of Section 11-2, "Asphalts," of these special provisions and these special provisions.

The grade of asphalt to be used will be specified in the various sections of these special provisions.

If steam-refined paving asphalt (AR) is specified, the asphalt shall conform to the following:

Steam-Refined Paving Asphalts

Specification Designation	AASHTO Test Method	Viscosity Grade				
		AR 1000	AR 2000	AR 4000	AR 8000	AR 16000
Tests on Residue from RTFO Procedure: (California Test 346)[a]						
Absolute Viscosity at 60°C, pascal second ($x10^{-1}$)	T202	750-1250	1500-2500	3000-5000	6000-10000	12000-20000
Kinematic Viscosity at 135°C, min., square meter per second ($x10^{-6}$)	T201	140	200	275	400	550
Pen. at 25°C, 100 g/5 sec., min.	T49	65	40	25	20	20
% of orig. Pen.[b] at 25°C, min.	—	—	40	45	50	52
Ductility at 25°C, mm, min.	T51	1000[c]	1000[c]	750	750	750
Tests on Original Asphalt:						
Flash Point, CL.O.C.°C, min.	T48	205	215	225	230	235
Solubility in Trichloroethylene, % min.	T44	99	99	99	99	99

a TFO (AASHTO Test Method T179) may be used but the RTFO shall be the referee method.

b Original penetration as well as penetration after the RTFO loss will be determined by AASHTO Test Method T49.

c If the ductility at 25°C is less than 1000 mm, the material will be acceptable if its ductility at 15°C is more than 1000 mm.

If the Department determines the mass of asphalt from volumetric measurements in conformance with the provisions in Section 92-1.04 of Section 11-2, "Asphalts," of these special provisions, the Engineer will use the Conversion Table in Section 93, "Liquid Asphalts," of the Standard Specifications and the following table:

Average Mass and Volumes of Paving Asphalt

Grade	Liters per Tonne at 15°C	Grams per Liter at 15°C
AR-1000	997	1002
AR-2000	989	1011
AR-4000	981	1020
AR-8000	981	1020
AR-16000	981	1020
PG 58-22	981	1020
PG 64-10	981	1020
PG 64-16	981	1020
PG 64-28	981	1020
PG 70-10	981	1020
PBA 6a	981	1020
PBA 6a (mod)	981	1020
PBA 6b	981	1020
PBA 7	981	1020

SECTION 11. MODIFIED STANDARD SPECIFICATION SECTIONS

SECTION 11-1. (BLANK)

SECTION 11-2. ASPHALTS

Asphalt shall conform to the provisions in this Section 11-2, "Asphalts" and the section entitled "Asphalt" in Section 8-1, "Miscellaneous," of these special provisions. Section 92, "Asphalts," of the Standard Specifications shall not apply.

SECTION 92: ASPHALTS

92-1.01 DESCRIPTION

Asphalt shall consist of refined petroleum or a mixture of refined liquid asphalt and refined solid asphalt, prepared from crude petroleum. Asphalt shall be:

A. Free from residues caused by the artificial distillation of coal, coal tar, or paraffin.
B. Free from water.
C. Homogeneous.

92-1.02 MATERIALS

92-1.02(A) GENERAL

The Contractor shall furnish asphalt in conformance with the Department's "Certification Program for Suppliers of Asphalt." The Department maintains the program requirements, procedures, and a list of approved suppliers at:

http://www.dot.ca.gov/hq/esc/Translab/fpmcoc.htm.

The Contractor shall ensure the safe transportation, storage, use, and disposal of asphalt.

The Contractor shall prevent the formation of carbonized particles caused by overheating asphalt during manufacturing or construction.

92-1.02(B) GRADES

Performance graded (PG) asphalt binder shall conform to the following:

Performance Graded Asphalt Binder

Property	AASHTO Test Method	Specification Grade PG 58-22 [a]	PG 64-10	PG 64-16	PG 64-28	PG 70-10
Original Binder						
Flash Point, Minimum °C	T48	230	230	230	230	230
Solubility, Minimum % [b]	T44	99	99	99	99	99
Viscosity at 135°C, [c] Maximum, Pa·s	T316	3.0	3.0	3.0	3.0	3.0
Dynamic Shear, Test Temp. at 10 rad/s, °C	T315	58	64	64	64	70
Minimum G*/sin(delta), kPa		1.00	1.00	1.00	1.00	1.00
RTFO Test [e], Mass Loss, Maximum, %	T240	1.00	1.00	1.00	1.00	1.00
RTFO Test Aged Binder						
Dynamic Shear, Test Temp. at 10 rad/s, °C	T315	58	64	64	64	70
Minimum G*/sin(delta), kPa		2.20	2.20	2.20	2.20	2.20
Ductility at 25°C Minimum, cm	T51	75	75	75	75	75
PAV [f] Aging, Temperature, °C	R28	100	100	100	100	110
RTFO Test and PAV Aged Binder						
Dynamic Shear, Test Temp. at 10 rad/s, °C	T315	22 [d]	31 [d]	28 [d]	22 [d]	34 [d]
Minimum G*sin(delta), kPa		5000	5000	5000	5000	5000
Creep Stiffness, Test Temperature, °C	T313	-12	0	-6	-18	0
Maximum S-value, MPa		300	300	300	300	300
Minimum M-value		0.300	0.300	0.300	0.300	0.300

Notes:

a. For use as asphalt rubber base stock for high mountain and high desert area.
b. The Engineer will waive this specification if the supplier is a Quality Supplier as defined by the Department's "Certification Program for Suppliers of Asphalt."
c. The Engineer will waive this specification if the supplier certifies the asphalt binder can be adequately pumped and mixed at temperatures meeting applicable safety standards.
d. Test the sample at 3°C higher if it fails at the specified test temperature. G*sin(delta) shall remain 5000 kPa maximum.
e. "RTFO Test" means the asphaltic residue obtained using the Rolling Thin Film Oven Test, AASHTO Test Method T240 or ASTM Designation: D 2827.
f. "PAV" means Pressurized Aging Vessel.

Performance based asphalt (PBA) binder shall conform to the following:

Performance Based Asphalt Binder

Property	AASHTO Test Method	Specification Grade PBA 6a	PBA 6a(mod)	PBA 6b	PBA 7
Absolute Viscosity (60°C), Pa·s($x10^{-1}$) [a]	T202				
Original Binder, Minimum		2000	2000	2000	1100
RTFO Test Aged Residue [b], Minimum		5000	5000	5000	3000
Kinematic Viscosity (135°C), $m^2/s(x10^{-6})$	T201				
Original Binder, Maximum		2000	2000	2000	2000
RTFO Test Aged Residue, Minimum		275	275	275	275
Absolute Viscosity Ratio (60°C), Maximum	—				
RTFO Test Visc./Orig. Visc.		4.0	4.0	4.0	4.0
Flash Point, Cleveland Open Cup, °C	T48				
Original Binder, Minimum		232	232	232	232
Mass Loss After RTFO Test, %	T240	0.60	0.60	0.60	0.60
Solubility in Trichloroethylene, % [c]	T44				
Original Binder, Minimum		Report	Report	Report	Report
Ductility (25°C, 5 cm/min), cm	T51				
RTFO Test Aged Residue [b], Minimum		60	60	60	75
On RTFO Test Aged Residue, °C	[f]				
1 to 10 rad/sec: SSD [e] ≥ 0 and Phase Angle (at 1 rad/sec) < 72°		—	35	—	—
On Residue from:	R28				
PAV [g] at temp., °C		100	100	100	110
Or Residue from Tilt Oven [f] (@113°C), hours		36	36	36	72
[e] SSD ≥ -115(SSV)-50.6, °C	[f]	—	—	—	25
Stiffness,	T313				
Test Temperature, °C		-24	-24	-30	-6
Maximum S-value, MPa		300	300	300	300
Minimum M-value		0.300	0.300	0.300	0.300

Notes:

a. Absolute viscosity (60°C) will be determined at one sec^{-1} using ASTM Designation: D 4957 with Asphalt Institute vacuum capillary viscometers.
b. "RTFO Test Aged Residue" means the asphaltic residue obtained using the Rolling Thin Film Oven Test (RTFO Test), AASHTO Test Method T240 or ASTM Designation: D 2827.
c. There is no requirement; however results of the test shall be part of the copy of test results furnished with the Certificate of Compliance.
d. "Residue from Tilt Oven " means the asphalt obtained using California Test 374, Method B, "Method for Determining Asphalt Durability Using the California Tilt-Oven Durability Test."
e. "SSD" means Shear Susceptibility of Delta; "SSV" means Shear Susceptibility of Viscosity.
f. California Test 381.
g. "PAV" means Pressurized Aging Vessel.

92-1.02(C) SAMPLING

The Contractor shall provide a sampling device in the asphalt feed line connecting the plant storage tanks to the asphalt weighing system or spray bar. The sampling device shall be accessible between 600 and 750 mm above the platform. The Contractor shall provide a receptacle for flushing the sampling device.

The sampling device shall include a valve:

A. With a diameter between 10 and 20 mm.
B. Manufactured in a manner that a one-liter sample may be taken slowly at any time during plant operations.
C. Maintained in good condition.

The Contractor shall replace failed valves.

In the presence of the Engineer, the Contractor shall take 2 one-liter samples per operating day. The Contractor shall provide round friction top containers with one-liter capacity for storing samples.

92-1.03 APPLYING ASPHALT

Unless otherwise specified, the Contractor shall heat and apply asphalt in conformance with the provisions in Section 93, "Liquid Asphalts."

The Contractor shall apply paving asphalt at a temperature between 120°and 190°C. The Engineer will determine the exact temperature of paving asphalt.

92-1.04 MEASUREMENT

If asphalt is paid as a contract work item on a mass basis, the Department will measure asphalt by the tonne under the provisions for determining the mass for payment of liquid asphalt in Section 93, "Liquid Asphalt."

The Engineer will determine the mass of asphalt from volumetric measurements if the Contractor:

A. Uses partial loads of asphalt.
B. Uses asphalt at locations other than a mixing plant and no suitable scales are available within 35 km.
C. Delivers asphalt meeting either of the following:

    1. In calibrated trucks and each tank is accompanied by its measuring stick and calibration card.
    2. In trucks equipped with a calibrated thermometer that determines the asphalt temperature at the time of delivery and equipped with a vehicle tank meter meeting Section 9-1.01, "Measurement of Quantities," for weighing, measuring, and metering devices.

If the Contractor furnishes asphalt concrete from a mixing plant producing material for only one project, the Department will determine the amount of asphalt from volumetric measurements by measuring the amount in the tank at the start and the end of the project provided the tank is calibrated and equipped with its measuring stick and calibration card. The Engineer will determine pay quantities in conformance with the following:

A. Before converting the volume to mass, the Engineer will reduce the volume measured to that which the asphalt would occupy at 15°C.
B. The Engineer will use the Conversion Table in Section 93, "Liquid Asphalts," and the following table:

Average Mass and Volumes of Paving Asphalt

Grade	Liters per Tonne at 15°C	Grams per Liter at 15°C
PG 58-22	981	1020
PG 64-10	981	1020
PG 64-16	981	1020
PG 64-28	981	1020
PG 70-10	981	1020
PBA 6a	981	1020
PBA 6a (mod)	981	1020
PBA 6b	981	1020
PBA 7	981	1020

CONTRACT NO. 07-242604
ADDED PER ADDENDUM NO. 3 DATED NOVEMBER 3, 2005

ENGINEER'S ESTIMATE
07-242604

Item No.	Item Code	Item Description	Unit of Measure	Estimated Quantity	Unit Price	Item Total
61 (S)	832003	METAL BEAM GUARD RAILING (WOOD POST)	M	47		
62 (S)	839303	SINGLE THRIE BEAM BARRIER (STEEL POST)	M	140		
63	034947	CONCRETE BARRIER (TYPE 60W) (MODIFIED)	M	4630		
64	839703	CONCRETE BARRIER (TYPE 60C)	M	3200		
65	034948	CONCRETE BARRIER (TYPE 60C) (WITH SCUPPERS)	M	140		
66	034949	CONCRETE BARRIER (TYPE 60G) (MODIFIED)	M	390		
67	839706	CONCRETE BARRIER (TYPE 60G)	M	120		
68 (F)	049886	CONCRETE BARRIER TYPE 60GA (MODIFIED)	M	86		
69	034950	CONCRETE BARRIER (TYPE 60GC) (MODIFIED)	M	220		
70	839709	CONCRETE BARRIER (TYPE 60GE)	M	80		
71	034951	CONCRETE BARRIER (TYPE 60GE) (MODIFIED)	M	380		
72 (S)	840561	100 MM THERMOPLASTIC TRAFFIC STRIPE	M	16 700		
73 (S)	840563	200 MM THERMOPLASTIC TRAFFIC STRIPE	M	380		
74 (S)	840570	100 MM THERMOPLASTIC TRAFFIC STRIPE (BROKEN 10.98 M - 3.66 M)	M	31 500		
75 (S)	840656	PAINT TRAFFIC STRIPE (2-COAT)	M	17 100		
76 (S)	034952	100 MM PAINT TRAFFIC STRIPE (2-COAT) (BROKEN 10.98 M - 3.66 M)	M	31 500		
77 (S)	850101	PAVEMENT MARKER (NON-REFLECTIVE)	EA	17 300		
78 (S)	850111	PAVEMENT MARKER (RETROREFLECTIVE)	EA	13 300		
79 (S)	860889	MODIFY TRAFFIC MONITORING STATION	LS	LUMP SUM	LUMP SUM	
80 (S)	861088	MODIFY RAMP METERING SYSTEM	LS	LUMP SUM	LUMP SUM	

ENGINEER'S ESTIMATE
07-242604

Item No.	Item Code	Item Description	Unit of Measure	Estimated Quantity	Unit Price	Item Total
81 (S)	861504	MODIFY LIGHTING AND SIGN ILLUMINATION	LS	LUMP SUM	LUMP SUM	
82 (S)	034953	MODIFY SOFFIT LIGHTING (COUNTY)	LS	LUMP SUM	LUMP SUM	
83	BLANK					
84	839576	END CAP (TYPE A)	EA	3		
85	839578	END CAP (TYPE TC)	EA	3		
86	839705	CONCRETE BARRIER (TYPE 60E)	M	35		
87	999990	MOBILIZATION	LS	LUMP SUM	LUMP SUM	

TOTAL BID: _____